



STATE OF MARYLAND

# DHMMH

**Maryland Department of Health and Mental Hygiene**  
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**January 18, 2008**

## **Public Health & Emergency Preparedness Bulletin: # 2008:02** **Reporting for the week ending 01/12/08 (MMWR Week #02)**

### **CURRENT HOMELAND SECURITY THREAT LEVELS**

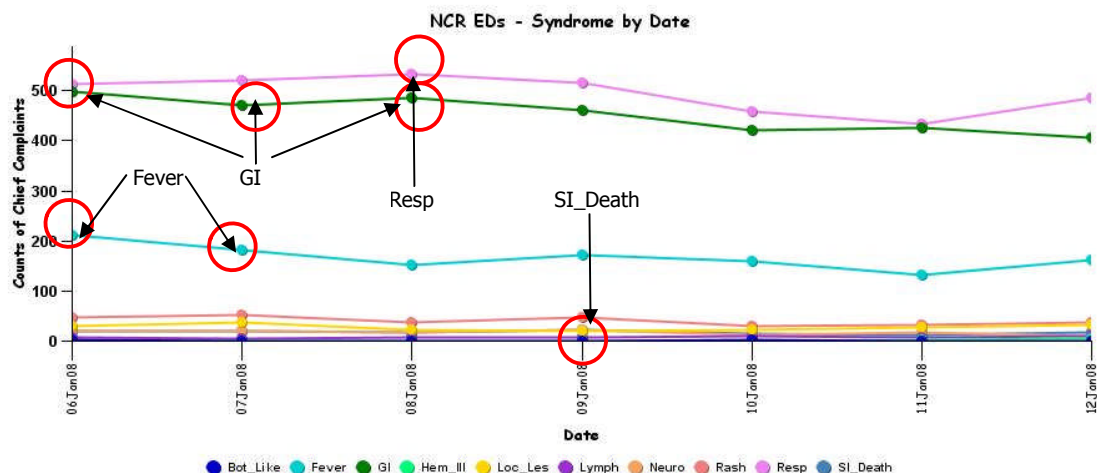
**National:** Yellow (ELEVATED) \*The threat level in the airline sector is Orange (HIGH)  
**Maryland:** Yellow (ELEVATED)

### **SYNDROMIC SURVEILLANCE REPORTS**

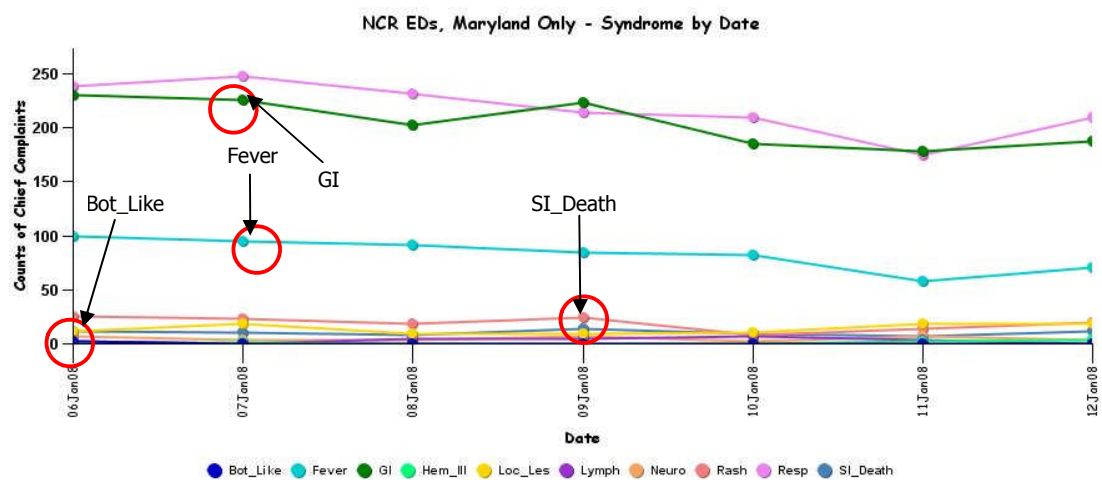
#### **ESSENCE (Electronic Surveillance System for the Early Notification of Community-based Epidemics):**

Graphical representation is provided for all syndromes, excluding the "Other" category, all age groups, and red alerts only. Note: ESSENCE – ANCR Spring 2006 (v 1.3) now uses syndrome categories consistent with CDC definitions.

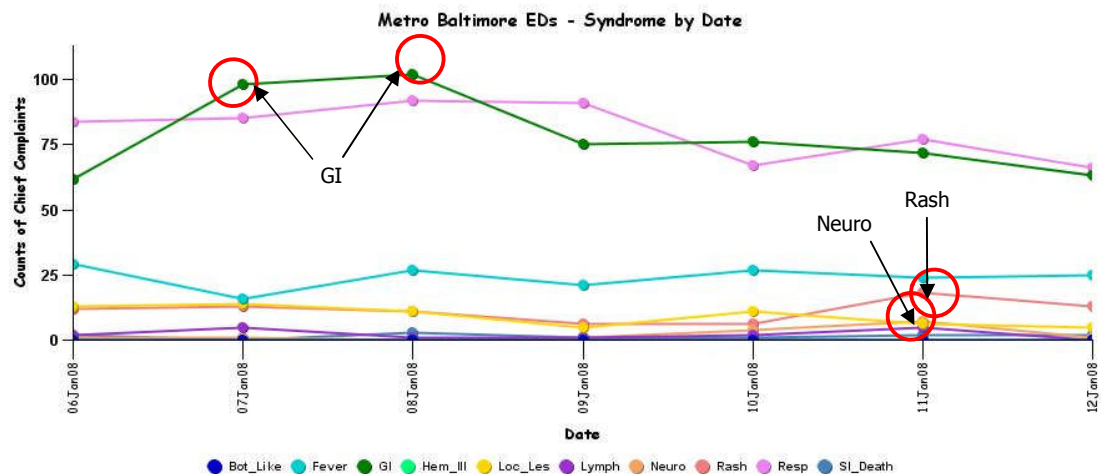
Overall, no suspicious patterns of illness were identified. Track backs to the health care facilities yielded no suspicious patterns of illness.



\* Includes EDs in all jurisdictions in the NCR (MD, VA, DC) under surveillance in the ESSENCE system



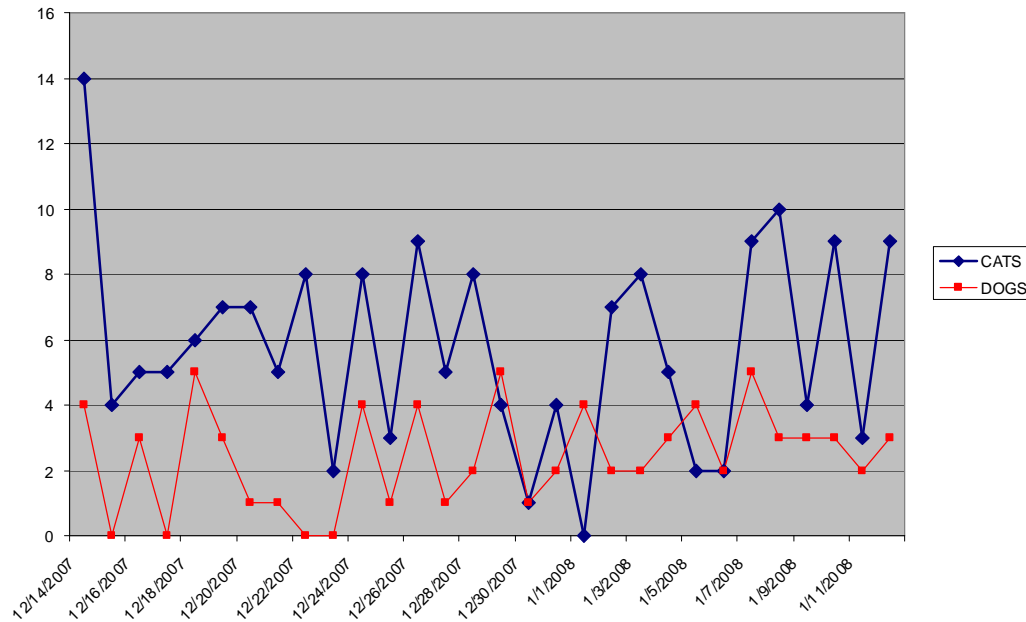
\* Includes only Maryland EDs in the NCR (Prince George's and Montgomery Counties) under surveillance in the ESSENCE system



\* Includes EDs in the Metro Baltimore region (Baltimore City and Baltimore County) under surveillance in the ESSENCE system.

**BALTIMORE CITY SYNDROMIC SURVEILLANCE PROJECT:** No suspicious patterns in the medic calls, ED Syndromic Surveillance and the animal carcass surveillance. Graphical representation is provided for animal carcass surveillance 311 data.

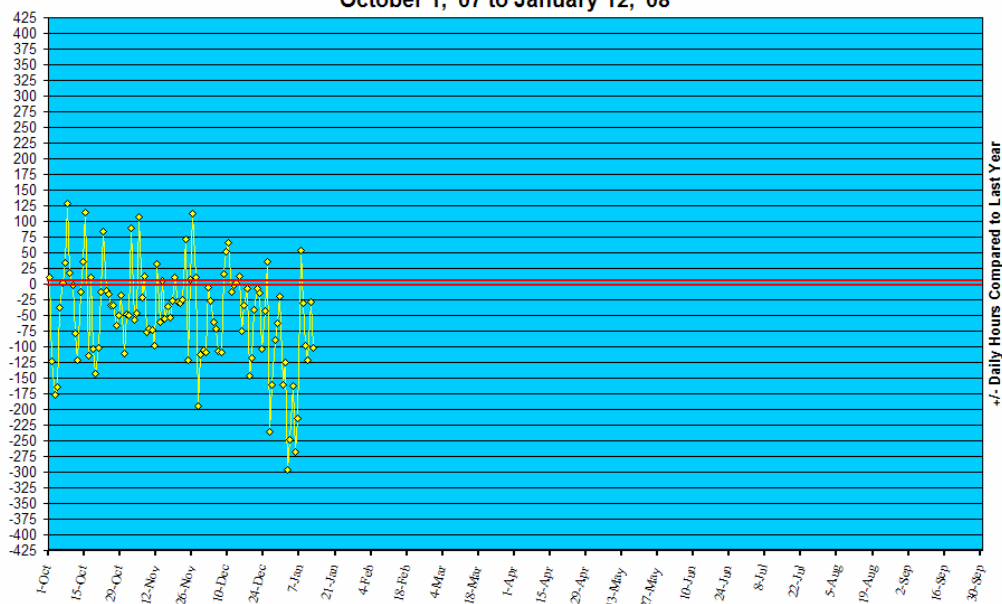
**Dead Animal Pick-Up Calls to 311**



## **REVIEW OF EMERGENCY DEPARTMENT UTILIZATION**

**YELLOW ALERT TIMES (ED DIVERSION):** The reporting period begins 10/01/06.

**Statewide Yellow Alert Comparison  
Daily Historical Deviations  
October 1, '07 to January 12, '08**



## **REVIEW OF MORTALITY REPORTS**

**OCME:** OCME reports no suspicious deaths related to BT for the week.

## **MARYLAND TOXIDROMIC SURVEILLANCE**

**Poison Control Surveillance Monthly Update:** Investigations of the outliers and alerts observed by the Maryland Poison Center and National Capital Poison Center in Dec. 2007 did not identify any cases of possible terrorism events.

## **REVIEW OF MARYLAND DISEASE SURVEILLANCE FINDINGS**

### **COMMUNICABLE DISEASE SURVEILLANCE CASE REPORTS (confirmed, probable and suspect):**

<b>Meningitis:</b>	<b><u>Aseptic</u></b>	<b><u>Meningococcal</u></b>
New cases (Jan 6 – 12, 08):	2	1
Prior week (Dec 30, 07 – Jan 5, 08):	16	0
Week#02, 2007 (Jan 7 – 13, 07):	8	1

**OUTBREAKS: 6 outbreaks were reported to DHMH during MMWR Week 2 (Jan. 6-Jan. 12, 2008):**

#### **3 Gastroenteritis outbreaks**

2 outbreaks of GASTROENTERITIS associated with Nursing Homes  
1 outbreak of GASTROENTERITIS associated with an Assisted Living Facility

#### **1 Respiratory illness outbreak**

1 outbreak of PNEUMONIA associated with an Assisted Living Facility

#### **1 Rash illness outbreak**

1 outbreak of CHICKENPOX associated with a Nursing Home

#### **1 Other outbreak**

1 outbreak of ACINETOBACTER associated with a Hospital

## **MARYLAND SEASONAL FLU STATUS:**

Seasonal Influenza reporting occurs October through May. No suspected cases of influenza were reported to DHMH during MMWR Week 02 (January 6 – 12, 2008). To date this season, there have been 158 lab confirmed influenza cases in Maryland.

\*Please note: Influenza data reported to DHMH through the National Electronic Disease Surveillance System (NEDSS) is provisional and subject to further review.

## **SYNDROMIC SURVEILLANCE FOR INFLUENZA-LIKE ILLNESS:**

Graph shows the percentage of total weekly Emergency Department patient chief complaints that have one or more ICD9 codes representing provider diagnoses of influenza-like illness. This graph does not represent confirmed influenza.



## **PANDEMIC INFLUENZA UPDATE / AVIAN INFLUENZA-RELATED REPORTS**

**WHO Pandemic Influenza Phase:** Phase 3/4: No or very little human-to-human transmission/Small clusters with limited human-to-human transmission, suggesting that the virus is not well adapted to humans

**US Pandemic Influenza Stage:** Stage 0/1: New domestic animal outbreak in at-risk country/Suspected human outbreak overseas

\*More information regarding WHO Pandemic Influenza Phase and US Pandemic Influenza Stage can be found at: <http://bioterrorism.dhmm.state.md.us/flu.htm>

**WHO update:** As of January 11, 2008, the WHO-confirmed global total of human cases of H5N1 avian influenza virus infection stands at 349, of which 216 have been fatal. Thus, the case fatality rate for human H5N1 is about 62%.

**AVIAN INFLUENZA, HUMAN (China):** 10 Jan 2008, Health authorities confirmed in China on Jan 10 that the latest human case of bird flu in the eastern province of Jiangsu, which involved a 52-year-old father, came from close contact with his infected son and not a viral mutation. The WHO has warned that the virus that causes the illness could mutate into a form that is highly infectious and easily transmissible from person to person. However, this case, although it involved the disease apparently passing from one person to another, does not exactly fit the profile of an infectious human-to-human outbreak, and it has remained something of a puzzle. "It has no biological features for human-to-human transmission," said Mao Qun'an, Health Ministry spokesman. An epidemiological investigation showed the father was infected through close contact with his son, he said. The cases took place in the provincial capital, Nanjing. The son, 24, and the first to be infected, died on Dec 2. The father was later confirmed to be infected with the H5N1 virus. At the time, the ministry said experts had found that the virus that infected the son had originated with poultry and had not mutated. But it remained unclear how the son was infected in the first place, as neither man had any known contact with dead poultry. The young man developed fever, chills and other symptoms on Nov 24 and was hospitalized on Nov 27 after being diagnosed with lower left lobe pneumonia. His father developed a fever and was hospitalized for lower lobe pneumonia on Dec 3, the day after his son's death. "The father has recovered," Mao said, adding that the cases have been effectively contained. Local authorities had kept 83 people who had close contact with either man under close observation but none had shown unusual symptoms so far, according to the ministry.

**AVIAN INFLUENZA, HUMAN (Pakistan):** 10 Jan 2008, Blood testing has confirmed that a U.S. resident whose brother was Pakistan's first confirmed case of H5N1 infection never contracted the disease. The New York State health department revealed that the man's blood showed no antibodies to H5N1, indicating he had not caught the virus while attending his brother's funeral in Pakistan in late 2007. "His final test came back. He showed no avian flu and no antibodies to avian flu, which means he never got it," Claudia Hutton, the department's director of public affairs, said. The man, who lives on Long Island, is part of a large family of brothers involved in a cluster of confirmed, probable and suspect cases. The other surviving brothers live in Pakistan. Because of the pattern of illnesses within the family, the WHO believes there was limited person-to-person spread of the virus among the relatives. But initial diagnostic efforts were only able to confirm one case, so follow-up blood work will be needed to determine how many people were actually infected. One member of the family, a veterinary worker, fell ill in October 2007 after helping to cull H5N1-infected poultry. While he was sick, at least 2 of his brothers nursed him. The veterinary worker survived but the 2 brothers died. The first man to die was never tested for H5N1. But a specimen taken from the second showed he was infected with the virus. Another brother was also ill and was hospitalized. The brother from Long Island experienced mild cold-like symptoms after returning from Pakistan. And his young son, who did not make the trip with him, also had a cold. The man went to his doctor, the doctor notified local public health authorities and they alerted the state. The CDC sent a plane to New York to collect specimens from the man and his son for testing in the CDC's Atlanta labs. They were both negative. They were also both negative in antibody testing. The WHO said this week that blood samples from the surviving family members in Pakistan have been sent to a U.S. Naval laboratory in Cairo that does influenza testing for the WHO. But it could be a couple of weeks or longer before results are available.

**AVIAN INFLUENZA, SWAN (United Kingdom):** 10 Jan 2008, Defra has confirmed avian influenza in 3 dead wild mute swans in the Chesil Beach area in Dorset, following positive test results from the Veterinary Laboratories Agency for the highly pathogenic H5N1. These birds were found and tested following routine surveillance. A Wild Bird Control Area and a Monitoring Area are being established around the premises. Inside the areas bird keepers are required to house their birds or otherwise isolate them from contact with wild birds, bird movements will be restricted, and bird gatherings banned. Defra is also working closely with ornithological experts to consider what wider measures may be needed. No disease has been found in domestic birds, and a program of surveillance is being carried out in the local wild bird population. There will be no culling of wild birds because such action may disperse birds further and would not aid control. All poultry keepers on the GB Poultry Register are being notified, and the EU Commission has been informed.

**AVIAN INFLUENZA, HUMAN (Indonesia):** 11 Jan 2008, The Ministry of Health of Indonesia has announced a new case of human infection of H5N1 avian influenza. A 16-year-old female from West Java Province developed symptoms on Dec 30, was hospitalized on Jan 4 and is currently in the hospital. Investigations found a history of deaths in chickens in the case's neighborhood in the 2 weeks preceding her onset of symptoms. Of the 117 cases confirmed to date in Indonesia, 94 have been fatal.

#### **NATIONAL DISEASE REPORTS:**

**SALMONELLOSIS (Montana, Texas, Pennsylvania):** 7 Jan 2008, Some people in Yellowstone County are infected with salmonella, the same strain that is making people sick in states as far away as Texas and Pennsylvania. Now the Yellowstone County Health Department is trying to figure out how they are connected. A communicable disease specialist at the health department said they are conducting interviews with the people infected here, and other states are doing the same with their cases. The information will then be sent to the Centers for Disease Control and Prevention (CDC), where experts will pinpoint the source of contamination. "The CDC will run it through an EPI program, and it's like a sorting program that goes through all the interviews and sorts through what item it could be," said Tamalee Taylor, communicable disease specialist at Yellowstone County Health Department. (Food Safety Threats are listed in Category B on the CDC list of Critical Biological Agents) \*Non-suspect case

**BOTULISM, CANNED BEANS, EXPANDED RECALL (Multi State):** 9 Jan 2008, New Era Canning Company of New Era, Michigan is announcing a new recall to include Mexican style chili beans, green beans, and dark red kidney beans that were shipped to food service and retail customers because a records review identified the possibility that a small number of cans from each lot may not have been adequately cooked. New Era is recalling these products as a precautionary measure because cans of vegetables that have not been adequately cooked have the potential for the growth of *Clostridium botulinum*. This recall only affects a small number of cases from the products with specific codes. We have been alerted that some of our cans may be missing the can codes. Any cans of these products without a code should not be opened or used, and should be disposed of as outlined below. Neither New Era nor the FDA are aware of any illnesses related to these products. New Era Canning in conjunction with the US Food and Drug Administration and the Michigan Department of Agriculture is thoroughly evaluating all processes and procedures to determine the cause of the problem. (Botulism is listed in Category A on the CDC list of Critical Biological Agents) \*Non-suspect case

#### **INTERNATIONAL DISEASE REPORTS:**

**CHOLERA (Angola):** 7 Jan 2008, A total of 38 new cases of cholera have been reported from the central hospital of Ondjiva, southern Cunene Province, from Jan 1 – 5, ANGOP has learnt. According to the official in charge of the cholera assistance sector, Anatercia Ndahambelega, with the notification of these cases in Ondjiva hospital, the current total rises to 68. Ndahambelega also revealed that these new cases are due to poor hygienic conditions and the nonobservation of the preventive measures published by the health authorities. (Water Safety Threats are listed in Category B on the CDC list of Critical Biological Agents) \*Non-suspect case

**CHOLERA (Kenya):** 7 Jan 2008, Cholera has broken out at a center hosting victims of post-election violence in Nandi. A total of 3 doctors were tackling the disease at Kapsabet police station, Nandi North district commissioner Mabeya Mogaka said. Mr. Mogaka added that the outbreak was occasioned by congestion, leading to poor sanitation at the station. He said the Government had evacuated more than 1000 people who had been displaced. They were among the 2100 who had been camping at the police station. They were evacuated under tight military security to safer places in Nakuru and Kisii. (Water Safety Threats are listed in Category B on the CDC list of Critical Biological Agents) \*Non-suspect case

**EBOLA HEMORRHAGIC FEVER (Uganda):** 7 Jan 2008, The discovery of 8 dead monkeys in the Rwenzori National Park in Bundibugyo District has again caused more fear and tension among locals who are just coming to terms with the Ebola outbreak that ravaged the area and is said to have been brought to the area by infected monkeys. District leaders and the health workers suspect that the monkeys may have been suffering from another virus but are all the same carrying out investigations. In a meeting of medical experts with the district leaders held on Jan 3 at the district headquarters that was aimed at assessing and fighting the Ebola epidemic, whose epicenter has been here, it was noted that the monkeys and chimpanzees have certain viruses in their blood similar to those detected in human blood samples. The investigations, however, will take cognizance of the fact that illegal hunting and killing of monkeys in the Mount Rwenzori range is going on uninterrupted. It was resolved that the district authorities of Bundibugyo with immediate effect will alert the Uganda Wildlife Authority to intervene since a good number of families living in the mountains are eating monkey meat and putting their lives at risk. Meanwhile, on Jan 4, the Director General of Health Services, Dr Sam Zaramba issued a statement saying that the cumulative total of Ebola patients stands at 149 with 37 deaths. "In Bundibugyo District, 5 people are currently admitted, one in Kikyo Health Centre and 4 in Bundibugyo Hospital. Of these, one new suspected case has been registered and was admitted to Bundibugyo Hospital in the last 24 hours. One patient was discharged from Kikyo Health Centre," the statement said. The statement had positive news also saying that 441 out of 771 contacts have completed 21 days of follow-up and are considered safe. Dr Zaramba, however, cautioned against "creating unnecessary panic." (Viral hemorrhagic fevers are listed in Category A on the CDC list of Critical Biological Agents) \*Non-suspect case

**CHOLERA (Laos):** 8 Jan 2008, A major diarrhea outbreak caused by cholera in Laos' southern Xekong province has, since Dec 25, 2007, affected 254 local people, of whom 3 died, Lao newspaper Vientiane Times on Jan 8. Recent tests have shown that the diarrhea outbreak is caused by the strain called *Vibrio cholerae* O1 Ogawa, the newspaper quoted director of the Xekong Public Health Department, Bounpone Phoxayavong, as reporting. "We are concerned about the outbreak because this can have deadly effects on humans in a short space of time. We've heard that in the past large numbers of people have died within a few days after contracting cholera because they were not able to obtain treatment

in time," said Bounpone. Bounpone said the department receives new reports of cases almost every day. Doctors failed to keep the outbreak under control because the local authorities were unable to prevent people from traveling in and out of the affected areas, he noted. (Water Safety Threats are listed in Category B on the CDC list of Critical Biological Agents) \*Non-suspect case

**CHOLERA (Viet Nam):** 9 Jan 2008, A total of 22 cases of acute diarrhea have been reported in Hanoi since the health ministry announced Dec 25 that the epidemic had been contained. Minister of Health Nguyen Quoc Trieu said on Jan 7 that 17 of the 22 cases had tested positive for severe acute diarrhea (cholera). The health ministry has urged the local government to instruct health and other officials to thoroughly inspect hygiene and safety at food production facilities and pumping stations supplying water to the city. After severe acute diarrhea was first detected in October 2007 in Hoang Mai precinct, a series of outbreaks hit the rest of the city. It spread to 13 Northern provinces and cities, affecting more than 1900 people. Of these, 295 tested positive for cholera. (Water Safety Threats are listed in Category B on the CDC list of Critical Biological Agents) \*Non-suspect case

**CHIKUNGUNYA (Taiwan):** 9 Jan 2008, Using fever screening upon arrival at international airports, the Taiwan Centers for Disease Control (CDC) identified 2 imported cases of chikungunya fever on Dec 28 and 30, 2007. One of these patients is an Indonesian worker; the other is also an Indonesian, who came to visit his relatives. Their disease onsets were Dec 20 and 27, 2007 respectively. After fever was identified, blood samples were taken. Chikungunya virus was identified by PCR. The Taiwan CDC has included chikungunya fever as a Category II communicable disease in order to increase awareness of the disease and prevent outbreaks. (Emerging Infectious Diseases are listed in Category C on the CDC list of Critical Biological Agents) \*Non-suspect case

**PLAGUE, FATAL (Madagascar):** 11 Jan 2008, The district of Manjakandriana has been confronted with the bubonic plague. With the last information communicated by the service of the transmissible disease, the disease has killed, up to now, 3 people. In addition to a 38-year-old man, an inhabitant of Manankasikely and dead on Jan 5, a 12-year-old is also dead in Ambohitseho. The third victim lived in the rural district of Ambatolaona, and his death occurred in Dec 2007. Moreover, as of Jan 10, 4 men and a woman are under treatment in the hospital complex of the district. "The rats haven't been beaten down. We have rushed a medical team to Manjakandriana to address the situation," said Dr. Rolland Robinson, chief of the service of the Emergencies and Transmissible Diseases within the Ministry of Health, Family Planning and Social Protection. In all the cases, the killing of rats are not done, because "that supports the profusion of the fleas and, so the recrudescence of the malady," said Dr. Robinson. He encourages the cleansing of the places and the insecticide use. (Plague is listed in Category A on the CDC list of Critical Biological Agents) \*Non-suspect case

**CHOLERA (Mozambique):** 11 Jan 2008, Since the start of the current cholera outbreak in Mozambique in October 2007, 12 people have died from the disease, according to Health Ministry statistics cited in the Jan 11 issue of the independent newssheet "Mediafax." The first cholera case was diagnosed in Maputo on Oct 8, 2007. By Jan 10, the number of diagnosed cases stood at 1396. Almost half of these cases, 673, occurred in Maputo city; 7 of these patients died. Maputo province reported 346 cases and 3 deaths. The other areas affected were Cabo Delgado in the far north (138 cases and 1 death), and the central province of Sofala (133 cases and 1 death). Cholera is endemic in Mozambique, and there are outbreaks, particularly in urban areas, almost every rainy season. The number of cases, however, does seem to be declining. Thus in 2006, 5431 cases were diagnosed, of whom 24 died. This compares with 20,000 cases and 117 deaths in 2004 and 15,000 cases and 113 deaths in 2003. (Water Safety Threats are listed in Category B on the CDC list of Critical Biological Agents) \*Non-suspect case

\*Cases and outbreaks will be cited for suspect level with regards to suspicion of BT threat. Therefore, cases and outbreaks will be categorized as "Determined BT", "Suspect" or "Non-suspect".

#### **OTHER RESOURCES AND ARTICLES OF INTEREST:**

More information concerning Public Health and Emergency Preparedness can be found at the Office of Preparedness and Response website: <http://bioterrorism.dhmm.state.md.us/>

#### **[Update on Avian Influenza A \(H5N1\) Virus Infection in Humans](#)**

This article provides a thorough and up-to-date review of H5N1 infection in humans. This review updates a 2005 report and incorporates information from the Second World Health Organization (WHO) Consultation on Clinical Aspects of Human Infection with Avian Influenza A (H5N1) Virus. (<http://content.nejm.org/cgi/content/full/358/3/261>)

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**NOTE:** This weekly review is a compilation of data from various surveillance systems, interpreted with a focus on a potential BT event. It is not meant to be inclusive of all epidemiology data available, nor is it meant to imply that every activity reported is a definitive BT event. International reports of outbreaks due to organisms on the CDC Critical Biological Agent list will also be reported. While not "secure", please handle this information in a professional manner. Please feel free to distribute within your organization, as you feel appropriate, to other professional staff involved in emergency preparedness and infection control.

For questions about the content of this review or if you have received this and do not wish to receive these weekly notices, please e-mail me. If you have information that is pertinent to this notification process, please send it to me to be included in the routine report.

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